youngsters attached no unusual significance to the ditch or to the fence. For a few days after they had left the grass and weeds in late July, buffy juveniles were seen sitting on posts throughout the whole west half of the marsh; territorial intolerance plainly did not persist this long in the season.

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## SEASONAL CHANGES IN A BIRD HABITAT IN TEXAS

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During thirty years of bird observation I have seen many and profound changes taking place in the country as a whole as well as in local, circumscribed bird-habitats. Many of these were unavoidable, such as the clearing of forests to be made into farms, which has been going on ever since the first settlement of the country. Some of these changes are violent and disastrous to bird and animal life in general, and many are unnecessary and even foolish. This would seem to apply especially to many of the changes, or rather the havoe, wrought by our modern genus of "realtors", or worse yet "sub-dividers". How they often unnecessarily and even foolishly cut down a copse of trees or a thicket of bushes is well known.

Equally disastrous is some of the modern draining of swamps, which so entirely changes the aspect of a countryside and deprives hundreds and thousands of birds and other animals of their legitimate habitat.

Once in awhile, however, it happens that nature herself produces a change for the better in a certain habitat. A very interesting instance of this kind was noticed by the writer in Texas during two stays there in 1925 and 1926. The former year was an exceptionally dry one, even for Texas, it not having rained in some parts for over a year or more. During the stay near Kingsville, some twenty miles north of Corpus Christi. I visited a so-called pasture. This, in the local vernacular, means a piece of original prairie, sparingly covered with the typical Texas small trees, such as mesquite, huisache, retama, and rattle-box (Daubentonia longifolia). In 1925 this place was bone-dry. The sparse grass more or less turned gray and brown, and the cow paths were distinctly dusty. The bird population was correspondingly small in this area of about a hundred acres. The only birds seen were Scissor-tailed Fly-catchers, Yellow-billed Cuckoos, Western Lark Spar-

rows, Western Mockingbirds, several pairs of Western Mourning Doves. Western Blue Grosbeak, and a Turkey Vulture sailing overhead.

The year 1926 on the contrary was an unusually wet year for this part of Texas. I again visited the same spot. To my surprise I heard a regular din and babel of bird voices issuing from it, even from a distance. On reaching the edge of the tree-covered area, I found it to be covered by two or three feet of water, on which floated thousands of the pretty blue water-lily (Castalia elegans), and other species equally interesting to the northerner. The bird population in numbers and variety was equally bewildering. Here is a list of species seen in this now lovely spot during five or six visits: 150 White-faced Glossy Ibises; several Wood Ibises; 1 Roseate Spoon-bill; several Pied-billed Grebes with nests; 10 Mexican Grebes, mostly with young on their backs; 100 Laughing Gulls; 30 Ruddy Ducks; 1 Scaup Duck; 75 Mexican Cormorants; 20 Anhingas; many Louisiana Herons, Little Blue Herons, Little Green, and Black-crowned Night Herons: 1 Ward's Heron; many Florida Gallinules, with nests or young; many Purple Gallinules, with nests and eggs: 200 Coots, with nests and eggs: 50 Black-necked Stilts; 1 Killdeer; several Rio Grande Red-wings; 1000 Great-tailed Grackles, with young in the nests, or eggs, as high as five nests in one bush.

Add to these the residents of the year before, plus four or five Nonpareils, several Gray-tailed Cardinals, a Lesser Cliff Swallow, and ten Texas Night Hawks soaring overhead and one has to admit that there was not only greatly increased bird life here, but a regular congestion of it. The poor old Scissor-tails certainly had their hands full. They ordinarily sail into every bird that comes near them, but this year they were overwhelmed, almost stupefied with the numbers of birds around them, so that they could only make weak attempts at jabbing any bird that came near them. The Great-tailed Grackles which frequently act the part of clowns among the birds of the Gulf Coast, here exhibited themselves as ogres. They sometimes sneaked up to a silently-standing young Black-crowned Night Heron and pushed it off its perch into the water below. This, however, would not disconcert the herons very much, as they would just swim up to the nearest bush and clamber up on it.

It is evident that such a natural change, produced simply by the difference between a dry and a wet season would be impossible in the latitude of Chicago and probably in most other places.

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